

my own experiments, that the statement that the loss by evaporation only would be nine feet, is entirely erroneous. I propose, however, to enter on this subject more fully in a future paper.

VII.

OBSERVATIONS ON THE PROPOSED LOAN FOR PUBLIC WORKS IN VICTORIA.

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It is not my intention to discuss in this paper the general question of the expediency of a public loan for Victoria. I assume it as settled, that such a loan is to be raised, from English or foreign capitalists, for expenditure on reproductive works in this colony; and I propose merely to consider, whether it is likely to realize all the benefits which are ordinarily anticipated from it, and how far its doing so will depend on its being combined with other auxiliary measures.

A sum applied to the construction of public works must be expended on the three elements of materials, implements, and labour. No matter what intermediate processes it may pass through, it must eventually, so far as it effects its pur-

pose, be transmuted into these several agents; and any augmentation of its amount furnishes increased efficiency so far, and so far only, as it gives increased command of them in their required proportions.

Let us inquire, then, to what extent the acquisition of a loan of some millions will augment the supplies available to this colony of the above elements of production.

As regards the first two, that is to say, the various materials and implements which may be needed, no difficulties, of course, will exist. Every remittance sent to manufacturing countries for their purchase will despatch a corresponding consignment to Melbourne; and we can calculate beforehand, with tolerable precision, both the quantities which will be necessary, and their probable cost.

But these are secondary items in estimating the outlay involved in the proposed project. A far more important constituent, in this country, is the labour which turns them to account. It enters in a much larger proportion into the cost of construction, and affects so vitally every step taken, that any change in its rate of remuneration alters much more essentially the aggregate expenditure to be provided for, and the productive efficiency of a given amount of funds. Private contractors will say how readily such fluctuations of the labour market as we are accustomed to witness here, can make the difference between success and failure in the accomplishment of less formidable enterprises than those to which the present remarks are directed.

Now, suppose a system of public works to be projected, and a certain amount of money to be procured, and appropriated to the hiring of labourers. How far, in this colony, would this sudden increase of available funds draw forth an increased supply of labour to work out the scheme, and how far would it, in all probability, fail of doing so?

I say "in this country," because it is on the peculiar circumstances of Victoria, and its complete dissimilarity from

most old countries in the conditions affecting this question, that the observations I have to make are founded.

In England, and countries similarly circumstanced, there is in all ordinary times a large proportion of the labouring classes either wholly or partially unemployed, and ready to fill any opening for work which may present itself. An accession, consequently, to the capital which operates upon the labour market is immediately met by an increase, both in the number of labourers available for production, and in the extent to which their services are actually employed. I believe that the amount of additional labour which is thus attainable in England for extraordinary purposes is inconceivable by those who have not studied the position of the working classes; and, through its instrumentality, every additional accumulation of capital which seeks the co-operation of labour, will obtain it in sufficient abundance to become fully effective.

In this country, on the other hand, there is, as a general rule, no unemployed class whatever; all who desire occupation for hire being able to procure it constantly, and for as many hours each day as they are willing to work. I do not mean to say that there are not individual exceptions, amongst new arrivals who have not yet learned to adapt themselves to the Colony; or that there may not be temporary local exceptions, where classes, unsuited to the requirements of a particular locality, persist in lingering there from week to week, instead of going where their services are in demand. But I say that these *are* exceptions; and that the general rule here is directly the opposite of what holds in old countries, inasmuch as all who wish to work for hire, are able to secure, and actually are engaged in constant, and full employment.

This being so, suppose a large loan were placed in our hands to-morrow; from what quarter are we to draw the additional supply of labourers requisite for prosecuting the projected undertakings?

It is undeniable that the great rise of money wages which would be consequent upon throwing the borrowed fund into the labour market, and which would first show itself on the works in question, would attract to these a considerable number of the labourers of the Colony. But whence can these men come? with the exception of the few who may chance at the moment to be out of employment,—a number inappreciably small, as I have said—they must be drawn either from the service of private capitalists, or from the gold fields.

So far as they came from the former source, the pursuits of private enterprise would be crippled by their withdrawal; and, in a financial point of view alone, the Colony at large would suffer to an extent difficult to be predicted, from the check given to the development of its resources, in the numberless lines selected by individual interest, and likely therefore to be those of most urgent necessity to the country. Building and agriculture would decline; and rents, and prices of all productions of the Colony would rise.

Nay even the labouring classes themselves, to whose benefit this rise of wages might seem to conduce, however it might injure others, would find their increased money receipts more than counterbalanced by their diminished value in exchange for the necessaries and comforts of life; a diminution which would speedily result from the discouragement of production carried on by private employers.

Again, so far as the required supply was drawn from the population of the gold fields;—and this would occur to but an inconsiderable extent, without a very great enhancement of the rate of wages—it is easy to see that the Colony would be a loser by the diminished production of its great staple, gold. A loss which is not to be measured by the mere reduction of the gold returns, but by the stoppage of all the future production, of which the amount relinquished might have been the foundation; and by the check to emigration

which would ensue from any apparent failure of the mines.

The foregoing being the only sources within the colony, from which supplies of labour can be expected; it is clear that the prosecution of extensive undertakings, by the means referred to, would involve a very material advance of wages, to succeed in procuring workmen in adequate numbers. In fact, since the number of labourers is limited, and that number fully employed, the arrival of a large additional sum, to be expended in hiring workmen, would amount to nothing more than distributing amongst the same number of labourers as before a much larger amount of wages than before, without obtaining in return for it any increased quantity of work. No doubt, by bidding sufficiently high wages on the Government works, men would be procured, and the undertakings carried out. But this would only be effected, as has been shown, by withdrawing these men from their previous employments, and thereby injuring the colony by impairing other and most probably more essential branches of production. At the same time, the works for whose sake these sacrifices were incurred, would themselves be carried out, only with an incalculable waste of the money raised for their construction, through the total inadequacy of the supplies of labour attainable within the colony.

Nor could any material assistance be expected from the adjoining colonies. Their populations are too small, and too well off, to furnish those floating drafts of labour, by which, in old countries, an augmented local demand is so rapidly and abundantly satisfied. Our neighbours, moreover, have learned ere now, that an enhanced money income does not always imply an extended command of the comforts of life; and, although they would hear on the one hand of the nominal rise in the working man's gains, they would learn, on the other, with no less certainty, of the rise of prices by which it would be accompanied and neutralized.

As for immigration from Europe, it is obvious that whatever might be its existing amount, as influenced by other causes, it could not be increased by the attractions of the supposed Government expenditure, (and with this alone we are now concerned,) until too late to prevent the pernicious consequences described. The distance is so great, and the uncertainty felt as to Australian intelligence is so universal, that even should a mere rise of colonial wages occasion eventually any considerable enlargement of the stream of immigration, its effect would not be experienced here, until the works were half finished, and the mischief already done. It is to be remembered, too, that in Europe, as well as in the adjoining colonies, the attractions of high pay would be counterbalanced by the concurrent accounts of high prices.

If, then, the policy under discussion involves the waste of money, and the derangement of general industry, with its attendant evils, which have been pointed out as likely to ensue from its adoption, it is worth considering how far these evils may be obviated, and the fullest possible advantages of the scheme secured by subsidiary measures.

The only method which occurs to me of averting the ill consequences adverted to, is the somewhat matter of fact expedient, of importing the necessary supply of labourers from Europe, as we do such other requisites as can be obtained thence more advantageously than elsewhere. If it be worth our while to introduce into the country a large addition to our wages fund, it will be equally so to introduce along with it a corresponding accession to our available labouring classes.

To what precise extent, or by what machinery, this should be effected, it is unnecessary to discuss at present. The principle of the suggestion is no novelty in these colonies. We have long since discovered that no more profitable investment exists for our accumulating revenue than in securing a continuous influx of population; and that our

gold does not prove a very beneficial possession, when it is either left locked up in the coffers of the banks, for want of hands to render it productive, or squandered on consignments of goods which rot in the stores from lack of consumers. And, if this truth be admitted, in the case of gradual accumulations of income, it must hold still more strongly with regard to a sudden accession of money, such as we have been considering.

VIII.

ACCOUNT OF THE GUNYANG : A NEW INDIGENOUS FRUIT OF VICTORIA.

BY DR. FERD. MUELLER.

READ APRIL 5, 1855.

THE number of fruits indigenous in this colony is so limited, that any addition to them can not fail to attract a far more general attention, than even the most important discoveries in the medicinal properties of our plants, or in their geographical distribution or affinity likely would secure. With this view, I selected from a series of new plants, which were obtained during my last journey through the eastern parts of this colony, the "Gunyang," for an early publication. That the natives apply a special name to this production of our Flora warrants its usefulness in their nomadic life; and as, in fact, the Gipps' Land tribes collect this fruit eagerly, and as probably cultivation will improve it so much as to render the plant acceptable for our gardens, I hope to be excused in not having chosen a more valuable object for a special paper.

The Gunyang bush is a kind of *Solanum* or nightshade,